

CLAIMS

What is claimed is:

- 5           1.       A method of cleaning the neck on a funnel of a cathode-ray tube comprising:
- inserting a drain tube within said neck, the outer dimensions of said drain tube being less than the corresponding inner dimensions of said neck, wherein a gap exists between said drain tube and said neck;
- 10           directing a fluid through said gap; and
- draining said fluid, that was directed through said gap, through said drain tube, whereby said fluid cleans said neck.
2.       The method of claim 1 wherein the directing step comprises:
- 15           supplying said fluid into a cleaning unit ; and
- directing said fluid within said cleaning unit through a labyrinth flow controller causing fluid to flow along an inside surface of said neck.
3.       The method of claim 2 wherein a material was coated onto the inside
- 20           surface of said neck before the directing step, whereby said fluid removes at least a portion of said material after the directing step.
4.       The method of claim 2 wherein said labyrinth flow controller further comprises a plurality of channels for directing said fluid through said cleaning unit and
- 25           into said neck.
5.       The method of claim 3, further comprising curing a portion of said material that is not removed by flow of said fluid after the draining step.
- 30           6.       The method of claim 5 wherein heated air is continuously applied into said funnel and toward said neck during said directing and draining steps.

7. The method of claim 4, further comprising decreasing a turbulence of said fluid in each of said plurality of said channels toward said neck.